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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/717,335	11/19/2003	Joichi Bita	3408.68745	8257

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EXAMINER
DILLON, SAMUEL A

ART UNIT	PAPER NUMBER
2185	

MAIL DATE	DELIVERY MODE
12/19/2006	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

--The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

THE REPLY FILED <u>24 November 2006</u> FAILS TO PLACE THIS APPLICATION IN CONDITION FOR ALLOWANCE.

1. ☒ The reply was filed after a final rejection, but prior to or on the same day as filing a Notice of Appeal. To avoid abandonment of this application, applicant must timely file one of the following replies: (1) an amendment, affidavit, or other evidence, which places the application in condition for allowance; (2) a Notice of Appeal (with appeal fee) in compliance with 37 CFR 41.31; or (3) a Request for Continued Examination (RCE) in compliance with 37 CFR 1.114. The reply must be filed within one of the following time periods:

    a) ☒ The period for reply expires <u>3</u> months from the mailing date of the final rejection.

    b) ☐ The period for reply expires on: (1) the mailing date of this Advisory Action, or (2) the date set forth in the final rejection, whichever is later. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of the final rejection.

    Examiner Note: If box 1 is checked, check either box (a) or (b). ONLY CHECK BOX (b) WHEN THE FIRST REPLY WAS FILED WITHIN TWO MONTHS OF THE FINAL REJECTION. See MPEP 706.07(f).

Extensions of time may be obtained under 37 CFR 1.136(a). The date on which the petition under 37 CFR 1.136(a) and the appropriate extension fee have been filed is the date for purposes of determining the period of extension and the corresponding amount of the fee. The appropriate extension fee under 37 CFR 1.17(a) is calculated from: (1) the expiration date of the shortened statutory period for reply originally set in the final Office action; or (2) as set forth in (b) above, if checked. Any reply received by the Office later than three months after the mailing date of the final rejection, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

<u>NOTICE OF APPEAL</u>

2. ☐ The Notice of Appeal was filed on _____. A brief in compliance with 37 CFR 41.37 must be filed within two months of the date of filing the Notice of Appeal (37 CFR 41.37(a)), or any extension thereof (37 CFR 41.37(e)), to avoid dismissal of the appeal. Since a Notice of Appeal has been filed, any reply must be filed within the time period set forth in 37 CFR 41.37(a).

<u>AMENDMENTS</u>

3. ☐ The proposed amendment(s) filed after a final rejection, but prior to the date of filing a brief, will <u>not</u> be entered because

    (a)☐ They raise new issues that would require further consideration and/or search (see NOTE below);

    (b)☐ They raise the issue of new matter (see NOTE below);

    (c)☐ They are not deemed to place the application in better form for appeal by materially reducing or simplifying the issues for appeal; and/or

    (d)☐ They present additional claims without canceling a corresponding number of finally rejected claims.

    NOTE: _____. (See 37 CFR 1.116 and 41.33(a)).

4. ☐ The amendments are not in compliance with 37 CFR 1.121. See attached Notice of Non-Compliant Amendment (PTOL-324).

5. ☐ Applicant's reply has overcome the following rejection(s): _____.

6. ☐ Newly proposed or amended claim(s) _____ would be allowable if submitted in a separate, timely filed amendment canceling the non-allowable claim(s).

7. ☐ For purposes of appeal, the proposed amendment(s): a) ☐ will not be entered, or b) ☐ will be entered and an explanation of how the new or amended claims would be rejected is provided below or appended.

    The status of the claim(s) is (or will be) as follows:

    Claim(s) allowed: _____.

    Claim(s) objected to: _____.

    Claim(s) rejected: _____.

    Claim(s) withdrawn from consideration: _____.

<u>AFFIDAVIT OR OTHER EVIDENCE</u>

8. ☐ The affidavit or other evidence filed after a final action, but before or on the date of filing a Notice of Appeal will <u>not</u> be entered because applicant failed to provide a showing of good and sufficient reasons why the affidavit or other evidence is necessary and was not earlier presented. See 37 CFR 1.116(e).

9. ☐ The affidavit or other evidence filed after the date of filing a Notice of Appeal, but prior to the date of filing a brief, will <u>not</u> be entered because the affidavit or other evidence failed to overcome <u>all</u> rejections under appeal and/or appellant fails to provide a showing a good and sufficient reasons why it is necessary and was not earlier presented. See 37 CFR 41.33(d)(1).

10. ☐ The affidavit or other evidence is entered. An explanation of the status of the claims after entry is below or attached.

<u>REQUEST FOR RECONSIDERATION/OTHER</u>

11. ☒ The request for reconsideration has been considered but does NOT place the application in condition for allowance because: <u>See Continuation Sheet.</u>

12. ☐ Note the attached Information Disclosure Statement(s). (PTO/SB/08) Paper No(s). _____

13. ☐ Other: _____.

Continuation of 11.

1.   The Applicant contends that neither of the cited references, whether taken alone or in combination, teaches or suggests that **a first controller acquires a storage page in a mirror area of a second cache memory by referring to a first mirror management table in the first controller**. The Examiner respectfully disagrees.

As stated in the previous action, the Examiner asserts that Hubis discloses all elements of <u>Claims 1 and 9</u> except for the mirror management table. Hubis additionally discloses that if a write operation cannot be confirmed, the controller re-attempts the write operation *(column 3 lines 55-63)*. When data is written to *either* one of Hubis' controllers, the controller will attempt to write the data to the other controller's mirror area until it successfully completes.

Conversely, Kitamura discloses two programs, one for registering content to be mirrored in a mirror management table and one for performing the actual mirroring operation *(column 14 lines 4-38)*. As the Examiner stated before, the motivated combination is to have Kitamura's method of decoupling the registering content and the actual mirroring to replace the write repeating of Hubis. This combination would imply that when the controller in Hubis receives a write command, it registers the mirror-write operation with the local mirror management table, and the mirror control program executes the mirror-write operation. This combination would also imply a mirror management table for each controller, as each controller can initiate a mirror-write operation.

Accordingly, the combination of Hubis and Kitamura does disclose a first controller *(Hubis' controller that receives a write command)* acquires a storage page in a mirror area of a second cache memory *(creates a mirrored copy in the mirror area of the other controller, as*

taught by Hubis) by referring to a first mirror management table in the first controller *(registers the content to be mirrored in the mirror management table, as taught by Kitamura).*

2.   The Applicant additionally contends that **the Examiner has provided no support for the desirability of making the proposed combination of references**. The Examiner respectfully disagrees.

As stated previously, the motivation for using Kitamura's mirror management table would have been the ease of managing the storage locations in the memory's mirror. Instead of the controller retrying until there is a successful write to the mirror, the content is merely registered for mirroring by the system manager, and then is mirrored separately by the mirror control program *(column 14 lines 21-38)*. The controller's involvement in the mirroring operation itself is diminished, which allows it to concentrate on read and write operations.

When parsing the phrasing *"the memories mirror"*, the Examiner notes that Hubis discloses splitting up each controller's memories into at least a write portion and a mirror portion, with the write portions' mirror existing in the other controller. The most reasonable interpretation of the phrasing would be to read *"the memory"* as being the write portion and *"the memories mirror"* as being the mirror area corresponding to that specific write portion.

3.   The Applicant finally contends that <u>**Claims 2-8 and 10-16 are traversed due to their dependence on Claims 1 and 9**</u> respectively. The Applicant is directed to the Examiner's response above.

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